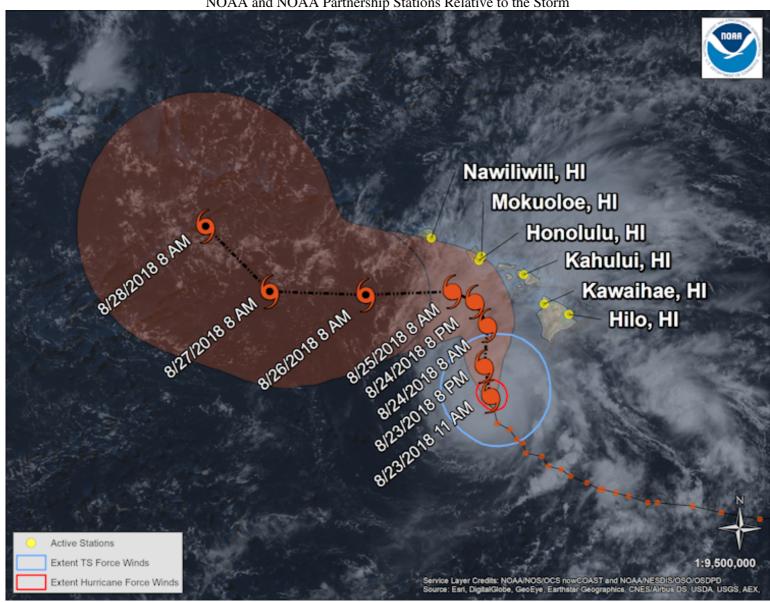


NOAA and NOAA Partnership Stations Relative to the Storm



Storm Analysis

As of 8/23/2018 12:00 HST water levels across the Hawaiian Islands remain slightly elevated and generally range around .40 to .70 feet above normal tide levels. Winds of 10 - 20 knots are being observed at most stations with gusts over 20 knots measured on the islands of Hawai'i (Hilo and Kawaihae) and Maui (Kahului) over the past 6 hours. Gusts have reached up to 35 knots at Kawaihae. Barometric pressure continues to slowly decrease across the region.

Water Level and Meteorological plots available below are updated automatically. A line denoting <u>Mean Higher High Water</u> (MHHW) is displayed to provide an approximate indication of when flooding inundation may occur.

For additional real-time and historical inundation information for select stations affected by this storm, please visit <u>Coastal Inundation Dashboard</u>. For additional data, please see the <u>Center for Operational Oceanographic Products & Services</u> website.

For more information or archived products and reports, please visit the **Storm QuickLook** Homepage.

Analyst: ADM

Select Central Pacific Hurricane Center Advisory Information:

Hurricane Lane Advisory Number 37 NWS Central Pacific Hurricane Center Honolulu HI 1100 AM HST Thu Aug 23 2018

...EYE OF LANE PASSES OVER NOAA BUOY 51002 AS THE DANGEROUS HURRICANE CONTINUES TO SLOWLY MARCH TOWARD THE MAIN HAWAIIAN ISLANDS...

WATCHES AND WARNINGS

CHANGES WITH THIS ADVISORY:

None.

SUMMARY OF WATCHES AND WARNINGS IN EFFECT:

A Hurricane Warning is in effect for...

- * Oahu
- * Maui County...including the islands of Maui, Lanai, Molokai and Kahoolawe
- * Hawaii County

A Hurricane Watch is in effect for...

* Kauai County...including the islands of Kauai and Niihau

A Hurricane Warning means that hurricane conditions are expected somewhere within the warning area. Preparations to protect life and property should be rushed to completion.

A Hurricane Watch means that hurricane conditions are possible within the watch area.

Interests in the the Northwestern Hawaiian Islands should monitor the progress of Hurricane Lane.

For storm information specific to your area, please monitor products issued by the National Weather Service office in Honolulu Hawaii.

DISCUSSION AND OUTLOOK

At 1100 AM HST, the center of Hurricane Lane was located ABOUT 200 MI SSW OF KAILUA-KONA HAWAII and ABOUT 275 MI S OF HONOLULU HAWAII. Lane is moving toward the northwest near 7 mph. A slow northward motion is expected to begin today. A turn toward the west is expected Saturday and Sunday, with an increase in forward speed. On the forecast track, the center of Lane will move over, or dangerously close to portions of the main Hawaiian islands later today through Friday.

Maximum sustained winds are near 130 mph with higher gusts. Lane remains a powerful category 4 hurricane on the Saffir-Simpson Hurricane Wind Scale. Some weakening is forecast during the next 48 hours, but Lane is expected to remain a hurricane as it draws closer to the islands.

Hurricane-force winds extend outward up to 35 miles from the center and tropical-storm-force winds extend outward up to 140 miles.

NOAA Buoy 51002 located about 250 miles southwest of the Big Island reported a peak wind of 107 mph as the northwest eyewall of Lane passed over. The buoy is now reporting light winds in the eye of the hurricane.

The estimated minimum central pressure is 949 mb.

HAZARDS AFFECTING LAND

WIND: Tropical storm conditions are expected on portions of the Big Island today, with hurricane conditions expected in some areas by tonight. Tropical storm conditions are expected to begin over portions of Maui County later today, with hurricane conditions expected in some areas by Friday. Tropical storm conditions are expected to begin on Oahu late tonight, with hurricane conditions expected Friday into Friday night. Tropical storm or hurricane conditions are possible on Kauai on Saturday.

RAINFALL: Rain bands will continue to overspread the Hawaiian Islands well ahead of Lane. Excessive rainfall associated with this slow moving hurricane will continue to impact the Hawaiian Islands into the weekend, leading to significant and life-threatening flash flooding and landslides. Lane is expected to produce total rain accumulations of 10 to 20 inches, with localized amounts in excess of 30 inches over the Hawaiian Islands. Nearly 20 inches of rain has already fallen on portions of the Big Island.

SURF: As Lane is slow-moving, large swells generated by the hurricane will severely impact the Hawaiian Islands over the next couple of days. These swells will produce very large and damaging surf along exposed west and south facing shorelines. A prolonged period of high surf will likely lead to significant coastal erosion.

STORM SURGE: The combination of a dangerous storm surge and large breaking waves will raise water levels by as much as 2 to 4 feet above normal tide levels along south and west facing shores nea the center of Lane. The surge will be accompanied by large and destructive waves.

NEXT ADVISORY

Next intermediate advisory at 200 PM HST. Next complete advisory at 500 PM HST.

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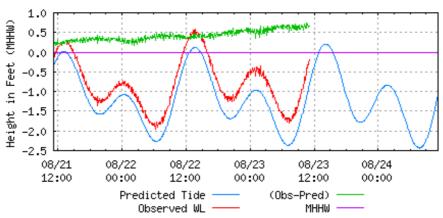
Forecaster R Ballard

For the purpose of timely release, data contained within this QuickLook have undergone a "limited" NOS Quality Assurance/Control; however, the data have not yet undergone final verification. All data subject to NOS verification.

Jump to: <u>Hilo, Hilo Bay, Kuhio Bay - Water Level, Hilo, Hilo Bay, Kuhio Bay - Winds, Hilo, Hilo Bay, Kuhio Bay - Barometric, Kawaihae - Water Level, Kawaihae - Winds, Kawaihae - Barometric, Kahului, Kahului Harbor - Water Level, Kahului, Kahului Harbor - Water Level, Mokuoloe - Water Level, Mokuoloe - Water Level, Mokuoloe - Water Level, Honolulu - Winds, Honolulu - Barometric, Nawiliwili - Water Level, Nawiliwili - Winds, Nawiliwili - Barometric</u>

NOAA/NOS/CO-OPS 1617760 Hilo, Hilo Bay, Kuhio Bay, HI

Preliminary Water Level, relative to Mean Higher High Water(MHHW)



Last Observed Sample: 08/23/2018 11:12 (HST). Data relative to MHHW Observed: -0.16 ft. Predicted: -0.79 ft. Residual: 0.63 ft. Historical Maximum Water Level: Jul 24 2017, 1.54 ft. Next High Tide: 08/23/2018 14:11 (HST), 0.21 ft.

NOAA/NOS/CO-OPS 1617760 Hilo, Hilo Bay, Kuhio Bay, HI

Wind Speed / Gusts / Direction 360 35 30 270 direction (true) speed (knots) 25 20 180 15 10 90 5 0 0 08/21 08/22 08/23 08/23 08/24 12:00 00:00 12:00 00:00 12:00 00:00 direction speed gusts

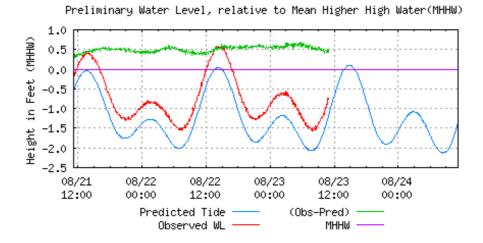
Last Observed Sample: 08/23/2018 11:12 (HST) Wind Speed: 9 knots Gusts: 15 knots Direction: 99° T

NOAA/NOS/CO-OPS 1617760 Hilo, Hilo Bay, Kuhio Bay, HI

Barometric Pressure 1017 1016 Pressure (mb) 1015 1014 1013 1012 1011 1010 1009 08/21 08/22 08/22 08/23 08/23 08/24 12:00 00:00 12:00 00:00 12:00 00:00 barometric pressure

Last Observed Sample: 08/23/2018 11:12 (HST)
Barometric Pressure: 1013.4 mb

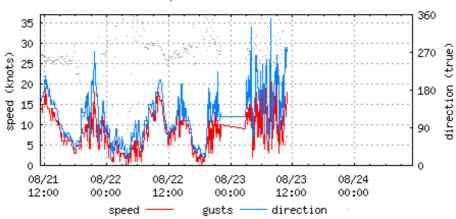
NOAA/NOS/CO-OPS 1617433 Kawaihae, HI



Last Observed Sample: 08/23/2018 11:00 (HST). Data relative to MHHW Observed: -0.74 ft. Predicted: -1.17 ft. Residual: 0.43 ft. Historical Maximum Water Level: Dec 15 2016, 1.33 ft. Next High Tide: 08/23/2018 14:51 (HST), 0.10 ft.

NOAA/NOS/CO-OPS 1617433 Kawaihae, HI

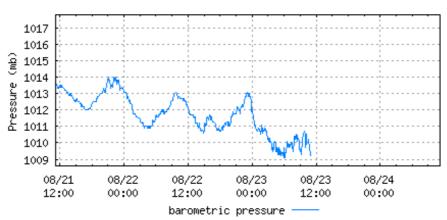
Wind Speed / Gusts / Direction



Last Observed Sample: 08/23/2018 11:00 (HST) Wind Speed: 18 knots Gusts: 28 knots Direction: 70° T

NOAA/NOS/CO-OPS 1617433 Kawaihae, HI

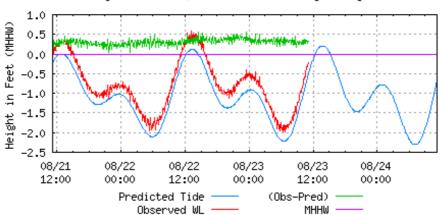
Barometric Pressure



Last Observed Sample: 08/23/2018 11:00 (HST)
Barometric Pressure: 1009.2 mb

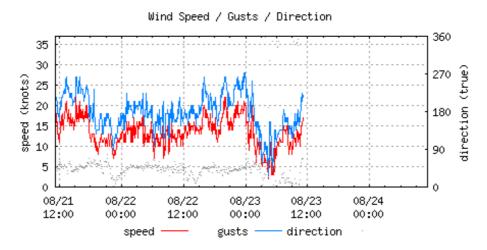
NOAA/NOS/CO-OPS 1615680 Kahului, Kahului Harbor, HI

Preliminary Water Level, relative to Mean Higher High Water(MHHW)



Last Observed Sample: 08/23/2018 11:12 (HST). Data relative to MHHW Observed: -0.19 ft. Predicted: -0.48 ft. Residual: 0.29 ft. Historical Maximum Water Level: Aug 21 2017, 1.33 ft. Next High Tide: 08/23/2018 13:46 (HST), 0.21 ft.

NOAA/NOS/CO-OPS 1615680 Kahului, Kahului Harbor, HI



Last Observed Sample: 08/23/2018 11:12 (HST) Wind Speed: 16 knots Gusts: 23 knots Direction: 61° T

NOAA/NOS/CO-OPS 1615680 Kahului, Kahului Harbor, HI

Barometric Pressure 1017 1016 Pressure (mb) 1015 1014 1013 1012 1011 1010 1009 08/21 08/22 08/22 08/23 08/23 08/24 12:00 00:00 12:00 00:00 12:00 00:00 barometric pressure

Last Observed Sample: 08/23/2018 11:12 (HST)
Barometric Pressure: 1013.3 mb

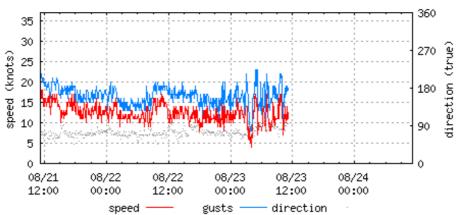
NOAA/NOS/CO-OPS 1612480 Mokuoloe, HI

Preliminary Water Level, relative to Mean Higher High Water(MHHW) 1.0 Height in Feet (MHHW) 0.5 0.0 -0.5-1.0 -1.5-2.0 -2.5 08/21 08/22 08/22 08/23 08/23 08/24 12:00 00:00 00:00 00:00 12:00 12:00 Predicted Tide (Obs-Pred) Observed WL MHHW

Last Observed Sample: 08/23/2018 11:12 (HST). Data relative to MHHW Observed: -0.06 ft. Predicted: -0.58 ft. Residual: 0.52 ft. Historical Maximum Water Level: Aug 21 2017, 1.47 ft. Next High Tide: 08/23/2018 13:56 (HST), 0.12 ft.

NOAA/NOS/CO-OPS 1612480 Mokuoloe, HI

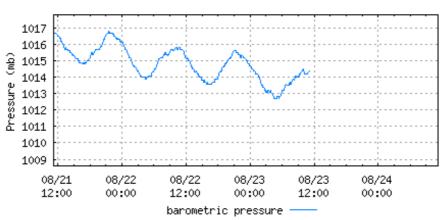
Wind Speed / Gusts / Direction



Last Observed Sample: 08/23/2018 11:12 (HST) Wind Speed: 14 knots Gusts: 20 knots Direction: 103° T

NOAA/NOS/CO-OPS 1612480 Mokuoloe, HI

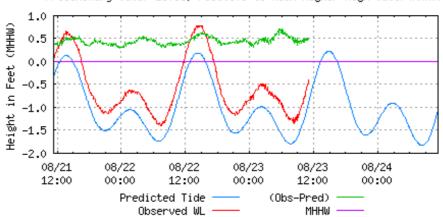
Barometric Pressure



Last Observed Sample: 08/23/2018 11:12 (HST)
Barometric Pressure: 1014.5 mb

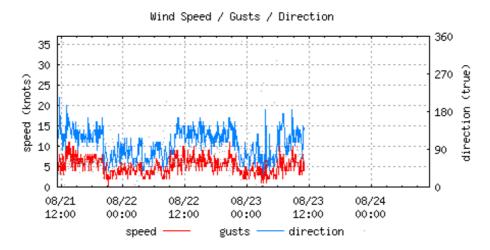
NOAA/NOS/CO-OPS 1612340 Honolulu, HI

Preliminary Water Level, relative to Mean Higher High Water(MHHW)



Last Observed Sample: 08/23/2018 11:06 (HST). Data relative to MHHW Observed: -0.40 ft. Predicted: -0.89 ft. Residual: 0.49 ft. Historical Maximum Water Level: Sep 11 1992, 1.47 ft. Next High Tide: 08/23/2018 14:50 (HST), 0.23 ft.

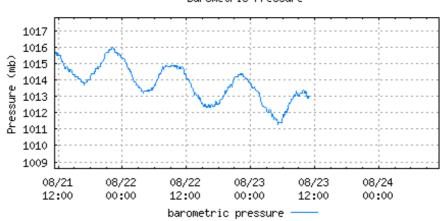
NOAA/NOS/CO-OPS 1612340 Honolulu, HI



Last Observed Sample: 08/23/2018 11:06 (HST) Wind Speed: 6 knots Gusts: 14 knots Direction: 64° T

NOAA/NOS/CO-OPS 1612340 Honolulu, HI

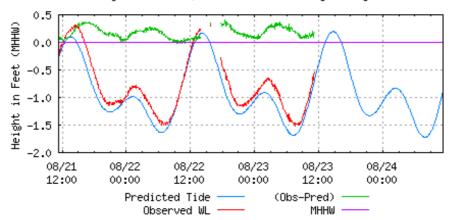
Barometric Pressure



Last Observed Sample: 08/23/2018 11:06 (HST)
Barometric Pressure: 1013.0 mb

NOAA/NOS/CO-OPS 1611400 Nawiliwili, HI

Preliminary Water Level, relative to Mean Higher High Water(MHHW)



Last Observed Sample: 08/23/2018 11:12 (HST). Data relative to MHHW Observed: -0.53 ft. Predicted: -0.71 ft. Residual: 0.18 ft. Historical Maximum Water Level: Sep 11 1992, 3.15 ft. Next High Tide: 08/23/2018 14:43 (HST), 0.20 ft.

NOAA/NOS/CO-OPS 1611400 Nawiliwili, HI

35 30

speed (knots)

5

08/21

12:00

08/22

00:00

speed

08/22

12:00

Wind Speed / Gusts / Direction

360

270 (a)

180 (c)

180 (c)

90 (d)

08/23

12:00

direction

08/24

00:00

Last Observed Sample: 08/23/2018 11:12 (HST) Wind Speed: 10 knots Gusts: 17 knots Direction: 51° T

gusts -

08/23 00:00

NOAA/NOS/CO-OPS 1611400 Nawiliwili, HI

Barometric Pressure 1017 1016 1016 (ag 1015 1014 1013 1012 4 1011 1010 1009 08/21 08/22 08/22 08/23 08/23 08/24 12:00 00:00 12:00 00:00 12:00 00:00 barometric pressure

Last Observed Sample: 08/23/2018 11:12 (HST)
Barometric Pressure: 1014.5 mb

Latest Water Level Observations on MHHW

Station ID	Station Name	Date/Time	Observed Water Level	Predicted Tide	Residual Water Level	24 Hour Maximum Storm Tide
1617760	Hilo, Hilo Bay, Kuhio Bay, HI	08/23/2018 11:12 (HST)	-0.16 ft	-0.79 ft	0.63 ft	0.59 ft
1617433	Kawaihae, HI	08/23/2018 11:00 (HST)	-0.74 ft	-1.17 ft	0.43 ft	0.63 ft
1615680	Kahului, Kahului Harbor, HI	08/23/2018 11:12 (HST)	-0.19 ft	-0.48 ft	0.29 ft	0.58 ft
1612480	Mokuoloe, HI	08/23/2018 11:12 (HST)	-0.06 ft	-0.58 ft	0.52 ft	0.68 ft
1612340	Honolulu, HI	08/23/2018 11:06 (HST)	-0.40 ft	-0.89 ft	0.49 ft	0.79 ft
1611400	Nawiliwili, HI	08/23/2018 11:12 (HST)	-0.53 ft	-0.71 ft	0.18 ft	0.32 ft

Center for Operational Oceanographic Products & Services (CO-OPS) | National Ocean Service (NOS) National Oceanic and Atmospheric Administration | U.S. Department of Commerce